

Amendments to the Claims

This listing of claims replaces all prior versions of the claims in the patent application:

Claim 1 (currently amended): A method for providing a user interface for controlling devices that are currently connected to a network, the method comprising:

displaying a user interface on one or more devices connected to the network capable of displaying a user interface, the user interface including at least one reference associated with each of said devices connected to the network for user selection of said one or more devices that are currently connected to the network; and

in response to selection of a reference associated with a device from the user interface, using the selected reference for communicating with the selected device over the network to directly access information for the selected device and dynamically generating a web-based control page for display on a browser for user interaction with the selected device via the web-based control page,

wherein the user interface for controlling the selected device is generated based on the information directly accessed from the selected device.

Claims 2-3 (canceled)

Claim 4 (previously presented): The method of claim 1, wherein said accessed information-for the selected device comprises an HTML page contained in that selected device.

Claim 5 (previously presented): The method of claim 1, wherein displaying the user interface comprises displaying the user interface on a browser on said one or more devices capable of displaying a user interface.

Claim 6 (previously presented): The method of claim 1, further comprising the steps of:

connecting at least one client device to the network capable of displaying a user interface; and

displaying a user interface on the client device for controlling server devices that are currently connected to the network.

Claim 7 (previously presented): The method of claim 1, wherein:

the accessed information resides in each device, and further includes a user control interface description for user interaction with the device,

the method further comprising, upon detecting user selection of a device from the user interface, using the associated reference to access the selected device and obtain the user control interface description in the selected device, and then displaying the obtained user control interface description as the control page for user command and control of the selected device.

Claim 8 (previously presented): The method of claim 1, further comprising generating the user interface such that the reference in that user interface provides access to at least the information for each associated device.

Claim 9 (previously presented): The method of claim 1, further comprising generating the user interface such that the user interface further includes device data corresponding to each device based on the information obtained from each device.

Claim 10 (previously presented): The method of claim 1, wherein the accessed information in each device includes device identification information and device description information.

Claim 11 (previously presented): The method of claim 1, wherein the accessed information in each device includes a user control interface description for user interaction with the device.

Claim 12 (previously presented): The method of claim 11, further comprising generating each user interface such that each reference in that user interface is linked to at least the user control interface description in each corresponding device; and detecting user selection of a device from one of said user interfaces, and using a reference in the user interface to access the control interface description in the device and then display the control interface description as a control page for user command and control of the device.

Claim 13 (previously presented): The method of claim 11, further comprising generating each user interface wherein that user interface further includes device data

corresponding to each device based on the information obtained from each device, the device data providing reference to the user control interface description in each device.

Claim 14 (currently amended): A webpage-based network system for performing a service, comprising:

 a physical layer, wherein the physical layer provides a communication medium that can be used by devices to communicate with each other;

 one or more devices connected to the physical layer, each device storing information including device description information;

 an agent in each of the one or more devices adapted for:

 (a) obtaining device description information directly from the one or more devices;

 (b) dynamically generating a webpage-based user interface utilizing the directly obtained device description information, the webpage-based user interface including one or more references associated with the information in one or more of said devices;

 (c) displaying said user interface on one or more client devices connected to the network, each client device including a browser capable of displaying the webpage-based user interface, for user control of said one or more devices; and

 (d) in response to selection of a reference associated with a device from the webpage-based user interface via a browser, using the reference to access

the selected device and directly access the information in the selected device to display a dynamically-generated control interface using the directly accessed information of the selected device for user interaction with the selected device, wherein the user interface for controlling the selected device is generated based on the information directly accessed from the selected device.

Claims 15–16 (canceled)

Claim 17 (previously presented): The system of claim 14, wherein said accessed information in each device comprises an HTML page contained in that device.

Claim 18 (previously presented): The system of claim 14, wherein each agent is further adapted for displaying the user interface on a browser on said one or more devices capable of displaying a user interface.

Claim 19 (previously presented): The system of claim 14, further comprising at least one client device connected to the network capable of displaying a user interface, wherein the one or more agents are further adapted for displaying a user interface on the client device, for controlling devices that are currently connected to the network.

Claim 20 (previously presented): The system of claim 14, wherein at least one of the devices currently connected to the network is capable of displaying a user interface, and the one

or more agents are further adapted for: displaying a user interface on said at least one device, for controlling the devices that are currently connected to the network.

Claim 21 (previously presented): The system of claim 14, wherein each agent is further adapted for generating a user interface such that the reference in the generated user interface provides access to at least the information in each corresponding device.

Claim 22 (previously presented): The system of claim 14, wherein each agent is further adapted for generating a user interface such that the user interface further includes device data corresponding to each device based on the portion of information obtained from each device.

Claim 23 (previously presented): The system of claim 14, wherein the accessed information in each device includes device identification information.

Claim 24 (previously presented): The system of claim 14, wherein the accessed information in each device includes a user control interface description for user interaction with the device.

Claim 25 (previously presented): The system of claim 24, wherein each agent is further adapted for generating each user interface such that each reference in that user interface is linked to at least the user control interface description in each corresponding device, and upon

detecting user selection of a device from one of said user interfaces, the agent uses a reference in the user interface of the selected device to access the control interface description in the selected device and then display the control interface description as a control interface for user command and control of the selected device.

Claim 26 (previously presented): The system of claim 24, wherein each agent is further adapted for generating a user interface that includes device data corresponding to each device based on the device description information obtained from each device, the device data providing reference to the user control interface description in each device.

Claim 27 (currently amended): A network system for performing a service, comprising:

a physical layer, wherein the physical layer provides a communication medium that can be used by devices to communicate with each other;

multiple devices connected to the physical layer, one or more of said multiple devices storing information including device information; and an agent adapted for:

(a) obtaining device information for devices currently connected to the network directly from the devices;

(b) dynamically generating a webpage-based user interface based at least on the directly obtained device information, the user interface including one or more references associated with the information in one or more of said devices currently connected to the network;

(c) displaying said webpage-based user interface on one or more client devices connected to the network capable of displaying the webpage-based user interface, for user control of said devices that are currently connected to the network; and

(d) in response to selection of a reference associated with a device from the webpage-based user interface, using the selected reference for accessing information for the device directly from the device to display a webpage-based control interface on a web browser using the accessed information of the selected device for user interaction with the selected device,

wherein the user interface for controlling the selected device is generated based on the information directly accessed from the selected device.

Claims 28–29 (canceled)

Claim 30 (previously presented): The system of claim 27, wherein said accessed information in each device comprises an HTML page contained in that device.

Claim 31 (previously presented): The system of claim 27, wherein each agent is further adapted for displaying a user interface on a browser on said one or more devices capable of displaying a user interface.

Claim 32 (previously presented): The system of claim 27, further comprising at least

one client device connected to the network capable of displaying a user interface, wherein the one or more agents are further adapted for displaying a user interface on the client device, for controlling devices that are currently connected to the network.

Claim 33 (previously presented): The system of claim 27, wherein at least one of said devices currently connected to the network is capable of displaying a user interface, and the one or more agents are further adapted for displaying a user interface on said at least one device for controlling devices that are currently connected to the network.

Claim 34 (previously presented): The system of claim 27, wherein each agent is further adapted for generating a user interface such that the reference in the generated user interface provides access to at least the information in each corresponding device.

Claim 35 (previously presented): The system of claim 27, wherein each agent is further adapted for generating each user interface such that the user interface further includes device data corresponding to each device based on the information obtained from each device.

Claim 36 (previously presented): The system of claim 27, wherein the accessed information in each device includes device identification information.

Claim 37 (previously presented): The system of claim 27, wherein the accessed information in each device includes a user control interface description for user interaction with

the device.

Claim 38 (previously presented): The system of claim 37, wherein each agent is further adapted for generating each user interface such that each reference in that user interface is linked to at least the user control interface description in each corresponding device, and upon detecting user selection of a device from one of said user interfaces, the agent uses a reference in the user interface of the selected device to access the control interface description in the selected device and then display the control interface description as a control interface for user command and control of the selected device.

Claim 39 (previously presented): The system of claim 37, wherein each agent is further adapted for generating each user interface wherein the generated user interface further includes device data corresponding to each device based on the information obtained from each device, the device data providing reference to the user control interface description in each device.

Claim 40 (previously presented): The method of claim 1, wherein displaying the control page comprises the steps of:

accessing said selected device in response to the selection of the reference associated with the selected device, and accessing the information contained in the selected device;

generating the control page including the device data corresponding to said

selected device using the accessed information contained in the selected device; and
displaying the control page on the one or more devices.

Claim 41 (currently amended): A method for displaying a webpage-based user interface for controlling application devices that are currently connected to a network, comprising the steps of:

(a) obtaining a first set of device information directly from the application devices;

(b) dynamically generating a webpage-based user interface based at least on the directly obtained first set of device information, the webpage-based user interface including one or more references associated with a second set of device information directly stored in one or more of said application devices;

(c) displaying said webpage-based user interface on a web browser for user control of said application devices; and

(d) in response to selection of a reference from the webpage-based user interface associated with an application device, displaying a control page on the web browser by accessing the selected application device over the network and accessing the second set of device information of said selected application device directly from said selected application device,

wherein the user interface for controlling the selected device is generated based on the first and second sets of information directly accessed from the selected device.

Claim 42 (previously presented): The method of claim 41, wherein displaying the

control page comprises the steps of:

accessing said selected application device in response to the selection of the reference associated with the selected application device, and accessing the second set of device information contained in the selected device;

generating the control page using the accessed second set of device information contained in the selected device; and

displaying the control page on the web browser in a control device.

Claim 43 (previously presented): The system of claim 14, wherein each agent is further configured for displaying the control interface by:

accessing said selected device in response to the selection of the reference associated with the selected device, and accessing the information contained in the selected device;

generating the control interface including the device data corresponding to said selected device using the accessed information contained in the selected device; and

displaying the control interface on one or more devices connected to the network capable of displaying a user interface.

Claim 44 (previously presented): The system of claim 27, wherein each agent is further configured for displaying the control interface by:

accessing said selected device in response to the selection of the reference associated with the selected device, and accessing the information contained in the selected device

generating the control interface including the device data corresponding to said selected device using the accessed information contained in the selected device; and

displaying the control interface on one or more devices connected to the network capable of displaying a user interface.

Claim 45 (previously presented): The method of claim 1, wherein the web-based control page is generated by receiving the information for the selected device directly from the selected device.

Claim 46 (new): The method of claim 1, wherein the user interface for controlling the selected device is generated from the selected device without accessing a remote controlled device memory.